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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/080,926	02/22/2002	Lin Zhi	015110.0096.UTL1	7786
36183	7590	01/21/2004	EXAMINER	
PAUL, HASTINGS, JANOFSKY & WALKER LLP P.O. BOX 919092 SAN DIEGO, CA 92191-9092			HUANG, EVELYN MEI	
			ART UNIT	PAPER NUMBER

1625

DATE MAILED: 01/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/080,926	ZHI ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Evelyn Huang	1625	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-97 is/are pending in the application.
- 4a) Of the above claim(s) 12,13,52 and 64-97 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11,14-39,42-51 and 53-63 is/are rejected.
- 7) ☒ Claim(s) 40 and 41 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.  
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).  
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                  | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). ____.  |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)         | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) ____. | 6) <input type="checkbox"/> Other:  |

### **DETAILED ACTION**

1. Claims 1-97 are pending.

#### ***Election/Restrictions***

2. In response to the restriction requirement, Applicant has elected with traverse the compound of Group III, claims 1-63. The species elected is Example 53 on page 68 of the specification, which reads on claims 1-2, 4-11, 18-19, 21-22, 27-38, 40-49, 53-54, 56-63 and the structural formula (I). Claims of the other groups are withdrawn from further consideration as being drawn to the non-elected inventions. The search has been conducted to the species compound, and its generic structural formula (I), and extended to structural formulae (II) -(IV). Claims of the other groups are withdrawn from further consideration as being drawn to the non-elected inventions. Claims directed to compounds outside of the species formula (I) -(IV) are claims 12, 13, 52.

Applicant argues that claims 12, 13, and 52 comprises subject matter within the scope of Group III and should not be withdrawn. Applicant further maintains that the examiner is required to search a reasonable number of species, if a generic or linking claim is found allowable. In the instant case, however, no generic claims are found allowable at the present time.

#### ***Claim Rejections - 35 USC § 102***

3. The rejection under 35 U.S.C. 102(b) as being anticipated by Kost (SU 548608, abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.
4. The rejection under 35 U.S.C. 102(b) as being anticipated by Grandberg (SU 241441, abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

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5. The rejection under 35 U.S.C. 102(b) as being anticipated by Gryaznov (abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

6. The rejection under 35 U.S.C. 102(b) as being anticipated by Yudin (abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

7. The rejection under 35 U.S.C. 102(b) as being anticipated by Chapman (J. Chem. Soc. 17:2334-9 (1970); Chem. Abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

8. The rejection under 35 U.S.C. 102(b) as being anticipated by Yoshikawa (abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

9. The rejection under 35 U.S.C. 102(b) as being anticipated by Kyotani (5576324) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

10. The rejection under 35 U.S.C. 102(a) as being anticipated by Ferlin (abstract) is withdrawn in view of the amendment limiting  $n=0$ , X to  $NR^{14}$ , Z to  $NR^{12}$  and  $R^{11}$  to the specific groups as recited.

***Claim Rejections - 35 USC § 112***

11. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

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Claims 18-22, 27, 28, 56, 53 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 18, 20, 21, 27, 53, 56, Z=O has no antecedent basis in the respective base claims 1 or 42, wherein Z is NR<sup>12</sup>. The rejection is applicable to claims dependent on the above claims.

### ***Duplicate Claims***

12. Claims 19, 22, 28 are objected to under 37 CFR 1.75 as being a substantial duplicate of claim 1 since the limitation that Z is R<sup>12</sup> (claim 19), n=0 (claim 22) or X=NR<sup>14</sup> (claim 28) fails to further limit the base claim 1. When two claims in an application are duplicates or else are so close in content that they both cover the same thing, despite a slight difference in wording, it is proper after allowing one claim to object to the other as being a substantial duplicate of the allowed claim. See MPEP § 706.03(k).

### ***Claim Rejections - 35 USC § 102***

13. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

14. Claims 1, 2, 4-11, 14-19, 21-39 are rejected under 35 U.S.C. 102(b) as being anticipated by Yamashkin et al. (Chemistry of Heterocyclic Compounds (New York)(Translation of Khimiya Geterotsiklicheskikh Soedinenii) (1999), Volume Date 1998, 34(9), 1050-1065, abstract). The compounds with the RN 243669-00-3, 243669-02-5, 243669-04-7, 243669-06-9, are encompassed by the instant claims.

15. Claims 1, 2, 4-11, 14-19, 21-39 are rejected under 35 U.S.C. 102(b) as being anticipated by El-Desoky (Zeitschrift fuer Naturforschung, B: Chemical Sciences (1998), 53(10), 1216-

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1222, abstract). The compounds with the RN 216073-29-9, is encompassed by the instant claims.

16. Claims 1, 2, 4-11, 14-19, 21-39 are rejected under 35 U.S.C. 102(b) as being anticipated by Majumdar et al. (Journal of Chemical Research, Synopses (1997), (9), 310-311, abstract). The compounds with the RN 198639-83-7, 198639-84-8, 198639-85-9, 198639-86-0, 198639-87-1, 198639-88-2, 198639-90-6, 198640-00-5, 198639-91-7, 198639-92-8, 198639-94-0, 198639-95-1, 198639-96-2, 198639-97-3, 198639-98-4, 198640-01-6, are encompassed by the instant claims. The phenoxymethyl, phenyl-carbonyloxymethyl, or methoxymethyl of the prior art compound reads on the instant 'substituted alkyl'.

17. Claims 1, 2, 4-11, 14-19, 21-39 are rejected under 35 U.S.C. 102(b) as being anticipated by Yamashkin et al. (Khimiya Geterotsiklicheskikh Soedinenii (1983), (4), 493-7, abstract). The compounds with the RN 86269-88-7, 86269-91-2, are encompassed by the instant claims.

18. Claims 1, 2, 4-11, 14-19, 21-39 are rejected under 35 U.S.C. 102(b) as being anticipated by Akhvlediani et al. (Zhurnal Organicheskoi Khimii (1981), 17(7), 1542-6, abstract). The compounds with the RN 80077-05-0, 80104-38-7, are encompassed by the instant claims.

### *Claim Rejections - 35 USC § 103*

19. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-11, 14-19, 21-38, 42-51, 53-62 are rejected under 35 U.S.C. 103(a) as being unpatentable over Adams (WO 00/12502).

Adams generically discloses a pyrroloquinoline compound for treating obesity (page 3) and compositions thereof. Specific examples are described (pages 19-22, Examples 1-3).

Adams' examples having a substituted alkyl on the pyrrolo nitrogen has a hydrogen whereas the instant has halogen, alkoxy, aryloxy, or alkylthio as R<sup>11</sup>.

Adams, however, teaches that hydrogen, halogen, alkoxy, aryloxy, and alkylthio are optional choices of the small preferred genus (page 7, lines 26-30).

At the time of the invention, one of ordinary skill in the art would be motivated to replace the hydrogen with the alternative halogen, alkoxy, aryloxy, and alkylthio to arrive at the instant invention with the reasonable expectation of obtaining an additional compound useful for treating obesity since Adams had clearly taught that any species within the genus, especially the preferred genus, would be effective in the treatment of obesity.

#### *Allowable Subject Matter*

20. The compounds of Group III in Claims 40-41, and the composition thereof, are allowable. These claims are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The instant compounds having a 3-2,2,2-trifluoroethyl and a 9-trifluoromethyl are not taught or suggested by the above references. Motivation to modify the prior art compound to arrive at the instant is lacking.

#### *Conclusion*

21. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after

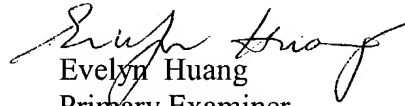
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the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

22. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Evelyn Huang whose telephone number is 703-305-7247. The examiner can normally be reached on Tuesday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Alan Rotman can be reached on 703-308-4698. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-1235.

  
Evelyn Huang  
Primary Examiner  
Art Unit 1625

1/19/04  
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